

**United States Environmental Protection Agency
EPA New England
One Congress Street, Suite 1100
Boston, MA 02114-2023**

January 11, 2005

To: J. Kilborn, EPA
H. Inglis, EPA
R. Howell, EPA (w/o attachments)
D. Moore, USACE
K.C. Mitkevicius, USACE
S. Steenstrup, MA DEP (2 copies)
R. Bell, Esquire, MA DEP
S. Peterson, CT DEP
A. Silber, GE
J. Novotny, GE
J.R. Bieke, Esquire, Shea & Gardner
S. Messur, BBL
D. Young, MA EOE
K. Munney, US Fish and Wildlife
D. Mauro, META Environmental, Inc.
R. Nasman, The Berkshire Gas Company
Mayor Ruberto, City of Pittsfield
Commissioner of Public Works and Utilities, City of Pittsfield
Public Information Repositories

RE: December 2004 Monthly Report
1.5 Mile Reach Removal Action
GE-Pittsfield/Housatonic River Site

Enclosed please find the December 2004 Monthly Report for the 1.5 Mile Reach Removal Action. In accordance with the Consent Decree for the GE-Pittsfield/Housatonic River Site, the United States Environmental Protection Agency (EPA) is performing the 1.5 Mile Reach Removal Action, with General Electric funding a portion of the project through a cost sharing formula.

The EPA has entered into an agreement with the United States Army Corps of Engineers (USACE) to assist in the design and construction of the Removal Action. The USACE subsequently awarded a design-construct contract to Weston Solutions, Inc. (Weston). Weston, with several subcontractors, will be performing the design and construction activities for the 1.5 Mile Reach Removal Action.

If you have any questions, please contact me at (413) 236-0969.
Sincerely,

Dean Tagliaferro
1.5 Mile Reach Removal Action Project Manager

1. Overview

During December 2004, the Environmental Protection Agency (EPA), the United States Army Corps of Engineers (USACE), the USACE's contractor, Weston Solutions, Inc., and Weston's subcontractors continued remediation activities on the 1.5 Mile Reach Removal Action. The primary work included completing excavation and backfilling activities in Cells 23W and 24W. In addition, transfer of non-TSCA and TSCA materials from the stockpile management areas to the GE On Plant Consolidation Areas (OPCAs) was performed. Also, transfer of non-TSCA materials from the stockpile management areas to approved off-site facilities continued.

2. Chronological description of tasks performed

Refer to Figure 1 for an orientation of the excavation cells and their respective locations.

By the end of November 2004, Cell 23W and 24W riverbank and riverbed excavation activities were almost completed. During the first week of December, Cell 23W and 24W excavation activities were completed. The excavated material was placed into an off-road articulated dump truck (ADT), which transported and dumped the material into a roll-off box located in the river channel in Cell 23. The material was then loaded into dump trucks by a long stick excavator located on the load-out area on Parcel I7-2-44. The excavated TSCA material was transported to Building 63 stockpile management area. The non-TSCA material was transported to Building 65 stockpile management areas. (See Table 1 for quantities of material generated in the month of December 2004 and Table 2 for quantities of material generated to date.)

The surveyors monitored the excavation activities in Cells 23W and 24W to ensure appropriate design excavation depths were achieved. The final excavation verification survey was completed in Cells 23W and 24W. Also, the staking out of the backfill grades was initiated in Cells 23W and 24W.

With a heavy rain on the way and high river flows expected, all excavated riverbanks were covered with poly anchored down by 12-inch riprap to prevent erosion. Stop logs were removed from the dam and the river channel flooded downstream of the dam.

Once the flood water receded, Cells 23 and 24 were dewatered. The surveyors completed staking out the riverbed and riverbank backfill grades in Cells 23W and 24W and backfilling activities were initiated. First, the riverbank erosion control debris was removed from the riverbanks in Cells 23W and 24W. The erosion control debris (approximately 30cy) was transported to Building 63 stockpile management area. Then, a temporary access ramp was built on the riverbank of Cell 24W to allow access to the west side of the river channel for backfill activities. The ramp was built from filter material. The riverbed will be backfilled with a layer of common fill, followed by a ten inch layer of filter material type 1, and a minimum of fifteen inch layer of 9-inch riprap. The lower riverbank in Cells 23W and 24W will be backfilled with a six-inch layer of common fill, a six-inch layer of filter material type 1 and a twenty four-inch

layer of 18-inch riprap up to the 1.5 year flood elevation, which is elevation 968.5 feet above mean sea level (AMSL). The riverbank above those elevations will be backfilled with the following: Common fill will be installed in twelve inch horizontal lifts and compacted to meet the 95% compaction requirement. Then, a minimum six-inch layer of topsoil, herbaceous seed mix and erosion control blankets will be installed. The "GE floodplain areas" excavated by the EPA will be backfilled with common fill and a minimum six-inch layer of topsoil, herbaceous seed mix and erosion control blankets. As part of backfill activities, a layer of geotextile fabric will be placed at the limit of remediation in the "GE floodplain area" to demarcate restored area from the un-remediated floodplain. The surveyors monitored the backfilling activities in Cells 23W and 24W to ensure appropriate design backfill grades were achieved.

Since the top of the riverbank in Cell 24W was lower than elevation 968.5 feet AMSL, the riprap extended to the top of the bank.

Restoration activities on Parcel I7-21-3 were completed. The flat sheet piles which were installed to stabilize the foundation on the structure located on Parcel I7-21-3 were cut to grade. A concrete mixture was poured over the two-inch stone that was placed between the sheet piles and the foundation to cap the sheet pile wall around the structure. This was performed to mitigate any damage to the structure that may have been caused during remediation activities.

The replacement/repair of silt fencing on both the east and the west riverbanks along the access roads between the Lyman Street Bridge and the Elm Street Bridge was performed.

Also, the vacuum truck sediment material (approximately 30cy) accumulated from the riverbed washing in Phase 2B and 2C was removed from the roll off box located on the water treatment system and transported to Building 68 stockpile management area. The sediment material was thickened with portland cement for transportation purposes prior to the transfer to Building 68.

During the second week of December, all backfill activities in Cells 23W and 24W were completed. Backfilling was completed in accordance with backfill configurations described above. Once the backfilling operations were completed on the lower riverbanks in Cells 23W and 24W the temporary access ramp was removed from the Cell 24W riverbank.

A 125-foot section of Cell 23W riverbank with slopes steeper than 2H:1V required cellular geoweb for riverbank stability purposes. The installation of the cellular geoweb on the Cell 23W riverbank was completed. Then, a minimum six-inch layer of topsoil was installed on all of Cell 23W riverbanks. Herbaceous seed mix and erosion control blankets were installed. Silt fencing was installed along the top of the riverbanks in Cells 23W as an erosion control measure.

The surveyors monitored the backfilling activities in Cells 23W and 24W to ensure appropriate design backfill grades were achieved. Once the backfilling was completed, the final restoration verification survey was completed.

Chipping of all the trees and brush removed from Phase 3A (staged at the GE Newell Street parking lot) was completed. The wood chip material was transported to the Area 64, Building 63 stockpile management areas, and then subsequently transferred to the GE OPCAs.

Other activities during the second week of December included the removal of the temporary upstream dam in Cell 19, adjacent to the Deming Street load-out area. The area of the dam was regarded to ensure the riverbed meets the backfill requirements.

Also, Holiday shutdown and winterization efforts were initiated. All construction equipment and supplies were relocated from the Parcel I7-2-44 staging area to the Lyman Street parking lot. Removal of material from the Deming Street staging area water treatment system transfer tank was initiated.

During the third week of December, the Holiday shutdown and winterization efforts were completed. The efforts associated with relocating the construction equipment and supplies from the Parcel I7-2-44 staging area to the Lyman Street parking lot continued. Removal of material from the Deming Street staging area water treatment system transfer tank was completed. Demobilization of the dewatering equipment was initiated. This included the removal of the 12-inch dri-prime pump located and the Cell 14W riverbank. The flushing and dewatering of the water treatment system was initiated.

All construction heavy equipment was decontaminated for the Holiday shutdown and staged at the Lyman Street parking lot.

The removal of debris from the temporary dam trash racks was completed.

Also, during the third week of December, the 54-inch HDPE pipe removal test cut was performed. The slide gates to the 54-inch pipes were closed, the pipe was dewatered and stop logs were removed from the temporary dam to allow enough water to move the 54-inch pipe onto the Cell 24W riverbank. The pipe was then tied off to two sheet piles and a 150-foot piece of the pipe was cut using a chain saw. The cut pipe was then moved to Parcel I8-24-1 staging area by transporting the pipe up the river channel. The stop logs were placed back onto the dam after the pipe test cut was completed.

On December 17, 2004 all major construction activities were suspended due to the Holiday shutdown.

During the month of December, the water treatment system treated water from Cells 20, 21, 22, 23 and 24. Sampling of the water treatment system for parameters included in the NPDES exclusion permit was performed on December 06, 2004. Due to heavy rain and snow falls and minimal remediation work, air monitoring for particulate matter (PM10 sampling) and surface water turbidity monitoring were not performed during the first couple of weeks of December. Due to the Holiday shutdown period and the minimal remediation activities (none of which require soil or sediment excavation) scheduled for the upcoming winter months, the monitoring activities were suspended on December 08, 2004. Surface water sampling for total suspended solids (TSS) and PCBs was performed on December 02, 2004. The monthly PCB air-monitoring event was performed on December 04, 2004. The twice a month surface water sampling and the monthly PCB air monitoring events were also suspended until excavation activities resume in the spring. PCB wipe samples were collected on decontaminated equipment. On December 02, 2004, two eight-point composite off-site disposal characterization samples were collected from the riverbed and riverbank materials excavated from Cells 23 and 24 (stockpiled in Building 65).

Also, two eight-point composite off-site disposal characterization samples were collected from the water treatment system modutank sediment material.

The transfer of cobble materials from the Area 64E stockpile management area to the Hill 78 OPCA was performed on December 02, 2004. The transfer of TSCA materials from the Area 64A, Area 64C and Building 63 stockpile management areas to the Building 71 OPCA was performed on December 13, 2004 and December 14, 2004. Also, the transfer of non-TSCA stumps and debris and soil material from the GE residential remediation was performed on December 02, 2004, December 15, 2004 and December 16, 2004. (See Table 3 for a summary of material transported to the OPCAs during the month of December 2004 and Table 4 for a summary of material transported to the OPCAs for the project through December 2004.)

The non-TSCA materials from the Area 64B, Area 64C, and Area 64D and Building 65 stockpile management areas were transported to the Waste Management of New Hampshire-TREE, Rochester, NH from December 01, 2004 to December 21, 2004. (See Table 5 for a summary of material transported to the Waste Management of New Hampshire-TREE, Rochester, NH during the month of December 2004.)

Stockpile management area activities continued throughout the month of December. Daily inspections, operation, and maintenance activities were performed within Buildings 63, 65, Area 64 (the outside stockpile area) and Building 68. Dust control procedures continued for access roads, parking areas, and material storage areas.

Traffic control was conducted on Lyman Street, Elm Street, Deming Street and Dawes Avenue during the month of December.

3. Sampling/test results received

Table 6 contains a summary of the PCB samples collected for the water treatment system sampling program on December 06, 2004. Results for PCB and TSS samples and water column monitoring data collected on December 02, 2004 are presented in Table 7. Summary of the PCB air sampling conducted on November 23, 2004 and December 04, 2004 are provided in Table 8. Table 9 contains data associated with PCB wipe samples collected on decontaminated equipment. Post-excavation off-site disposal characterization sample results for the riverbed and riverbank materials excavated from Cells 23 and 24 (stockpiled in Building 65) collected on December 02, 2004 are summarized in Table 10. Sample results associated with December 07, 2004 sampling of the water treatment system modutank sediment (stockpiled in Building 68) are presented in Table 11.

4. Diagrams associated with the tasks performed

Figure 1 is a map of Phase 1, the Transition Phase, Phase 2 and Phase 3A and includes the layout of all excavation cells, temporary dam, water monitoring locations, air sampling locations, access road locations, excavation load out locations, staging area locations, fence line location, the water treatment system pad location, and the utility trench location.

5. Reports received and prepared

Not Available.

6. Photo documentation of activities performed

See attached photos.

7. Brief description of work to be performed in January 2005

- Complete the removal of the 54-inch HDPE pipe.
- Initiate the placement of aquatic enhancements in the Transition Reach, Phase 2 and Phase 3A.
- Complete the removal of water treatment system (WTS) modutank sediment and initiate the decontamination and dismantling of the WTS (the WTS will eventually be relocated to Fred Garner Park)
- Complete the repair of the energy dissipater from the City outfall downstream of the Elm Street Bridge.
- Complete the repair of the ACB blocks.

8. Attachments to this report

Table 1. Quantity of Bank and Sediment Material Excavated during the Month of December

Table 2. Quantity of Bank and Sediment Material Excavated to Date

Table 3. Quantity of Material Transferred to OPCAs during the Month of December

Table 4. Quantity of Material Transferred to OPCAs to Date

Table 5. Quantity of non-TSCA Material Transferred to Waste Management of New Hampshire TREE in Rochester, NH during the Month of December

Table 6. NPDES PCB Sampling Results for Water Treatment System

Table 7. Summary of Turbidity, PCB, and TSS Water Column Monitoring Results

Table 8. PCB Air Sampling Results

Table 9. Equipment Confirmatory Wipe Sample Results

Table 10. Post-Excavation Soil/Sediment Stockpile Characterization Analytical Results

Table 11. Water Treatment System Modutank Material Characterization Analytical Results

Figure 1- 1.5 Mile Removal Action Site Map

Photo documentation

**Table 1 - Quantity of Bank and Sediment Material Generated During the Month of December
December 2004 Monthly Report**

**GE-Pittsfield/Housatonic River Project 1.5 Mile Removal Action
Pittsfield, MA**

(Results are reported in cubic yards)

		Approximate Quantity of Excavated Bank and Sediment Material		
Date	Location	non-TSCA	TSCA	NAPL impacted
Bank Soil and Sediment				
12/1/2004	Cell 23W	0	30	0
12/2/2004	Cell 24W	10	0	0
	Monthly total from bank soil and sediment	10	30	0

Note:

All quantities are in compacted or "in-place" cubic yards. All loads are estimated at 10cy per truck.

**Table 2 - Quantity of Bank and Sediment Material Excavated to Date
December 2004 Monthly Report**

**GE-Pittsfield/Housatonic River Project 1.5 Mile Removal Action
Pittsfield, MA**

(Results are reported in cubic yards)

		Approximate Quantity of Bank and Sediment Material Excavated to Date			
Date	Location	non-TSCA	TSCA	NAPL impacted	Total
09/26/02 to 10/02/02	Cell 1A	101	0	53	154
10/02/02 to 10/04/02	Cell 1B	60	0	110	170
10/18/02 to 10/29/02	Cell 2	874	175	0	1,049
11/11/02 to 11/15/02	Cell 3	183	0	200	383
11/18/02 to 11/25/02	Cell 4	2,283	198	0	2,481
12/03/02 to 12/10/02	Cell 5	1,629	369	0	1,998
01/07/03 to 01/15/03	Cell 6	832	658	0	1,490
01/10/03 to 01/29/03	Cell 6A	2,611	68	0	2,679
02/03/03 to 02/10/03	Cell 7&7A	1,114	636	0	1,750
02/20/03 to 02/24/03	Cell 5A	899	0	0	899
02/25/03 to 03/07/03	Cell 8&8A	1,245	90	0	1,335
03/14/03 to 03/18/03	Cell 9	603	307	0	910
03/27/03 to 04/07/03	Cell 10&10A	1,730	133	0	1,863
04/14/03 to 04/16/03	Cell 12	668	1,354	0	2,022
04/30/03 to 05/09/03	Cell 11	1,713	341	10	2,064
05/27/03 to 06/12/03	Cell 11A	957	166	462	1,585
06/25/03 to 07/29/03	Cell 12A	1,656	805	656	3,117
09/04/03 to 10/22/03	Cell 13	3,580	298	1,129	5,007
01/08/04 to 03/24/04	Cell 14&15	4,462	288	257	5,007
05/25/04 to 07/28/04	Cell 16&17	4,409	822	3,191	8,422
07/30/04 to 09/17/04	Cell 18&19	3,741	65	685	4,491
09/28/04 to 10/25/04	Cell 20	948	591	196	1,735
09/28/04 to 10/25/04	Cell 21	525	569	0	1,094
09/28/04 to 10/25/04	Cell 22	1,170	686	0	1,856
11/04/04 to 12/01/04	Cell 23	1,725	189	0	1,914
11/04/04 to 12/02/05	Cell 24	1,610	247	0	1,857
	Total	41,328	9,055	6,949	57,332

Note:

All quantities determined by pre- and post- excavation surveying.

**Table 3 - Quantity of Material Transferred to OPCAs During the Month of December
December 2004 Monthly Report**

**GE-Pittsfield/Housatonic River Project 1.5 Mile Removal Action
Pittsfield, MA**

(Results are reported in cubic yards)

		Approximate Quantity Transported to OPCAs	
Date	# of truckloads	Hill 78 (non-TSCA)	Bldg. 71 (TSCA)
Bank Soil and Sediment			
12/2/2004	16	176	0
12/13/2004	38	0	418
12/14/2004	39	0	429
Monthly totals	93	176	847

Note:

All quantities are in compacted or "in-place" cubic yards.

(1) Estimated at 11 cy per truck

Excludes 5 truck loads on 12/02/04 of stumps and debris excavated from the GE residential floodplain remediation area.

Excludes 21 truck loads on 12/15/04 and 12/16/04 of soil excavated from the GE residential floodplain remediation area.

**Table 4 - Quantity of Material Transferred to OPCAs to Date
December 2004 Monthly Report**

**GE-Pittsfield/Housatonic River Project 1.5 Mile Removal Action
Pittsfield, MA**

(Results are reported in cubic yards)

		Approximate Quantity Transported to OPCAs	
Date	Location	Hill 78 (non-TSCA)	Bldg. 71 (TSCA)
Site Preparation Activities			
09/11/02	Building 65 Stockpile Management Area	225	
Bank Soil and Sediment			
12/05/02 to 12/19/02	Stockpile Management Area/Excavation Cells	4,718 (1)	910 (1)
02/11/03 to 02/28/03	Stockpile Management Area/Excavation Cells	5,137 (2)	539 (2)
03/03/03 to 03/14/03	Stockpile Management Area/Excavation Cells	1,749 (2)	1,353 (2)
04/07/03 to 04/18/03	Stockpile Management Area/Excavation Cells	2,710 (3)	1,698 (3)
04/07/03 to 04/18/03	Stockpile Management Area/Cleanup Material	370 (3)	40 (3)
05/12/03 to 05/14/03	Stockpile Management Area/Excavation Cells	1,826 (3)	0
05/12/03 to 05/14/03	Stockpile Management Area/Cleanup Material	220 (3)	0
06/11/03 to 06/12/03	Stockpile Management Area/Excavation Cells	0	704 (3)
06/16/03 to 06/17/03	Stockpile Management Area/Excavation Cells	712 (3)	0
06/16/03 to 06/17/03	Stockpile Management Area/Cleanup Material	146 (3)	0
07/07/03 to 07/11/03	Stockpile Management Area/Excavation Cells	1,188 (3)	748 (3)
09/15/03 to 09/30/03	Stockpile Management Area/Excavation Cells	2,090 (3)	308 (3)
10/28/03 to 10/30/03	Stockpile Management Area/Excavation Cells	1,623 (3)	33 (3)
10/28/03 to 10/30/03	Stockpile Management Area/Cleanup Material	181 (3)	0
11/18/03	Demolition Debris from Parcels I8-10-2 and I8-10-3	200 (4)	0
1/12/04	Stockpile Management Area/Excavation Cells	77 (3)	0
04/28/04 to 4/30/04	Stockpile Management Area	0	825 (3)
05/12/04 to 05/27/04	Stockpile Management Area/Excavation Cells/Outfall Repair on Parcel I8-23-6	1,518 (3)	484 (3)
06/03/04 to 06/22/04	Stockpile Management Area	0	528 (3)
07/06/04 to 07/16/05	Stockpile Management Area	396 (3)	836 (3)
08/11/04 to 08/31/04	Stockpile Management Area	1,045 (3)	0
09/28/04 to 09/30/04	Stockpile Management Area	1,375 (3)	0
10/01/04 to 10/14/04	Stockpile Management Area	352 (3)	1,958 (3)
11/01/04 to 11/15/04	Stockpile Management Area	363 (3)	1,342 (3)
12/02/04 to 12/14/04	Stockpile Management Area	176 (3)	847 (3)
Project Totals		28,238	13,153

Pursuant to the Consent Decree, EPA is allowed to dispose of up to 50,000cy of material into GE OPCAs. Pursuant to August 2004 agreement between EPA and GE, EPA is allowed to dispose an additional 750cy of material into the GE OPCAs to account for a portion of the volume of material generated as part of the removal of the gabion baskets and reno mattresses along Deming Street.

Notes:

All quantities are in compacted or "in-place" cubic yards.

- (1) Estimated at 14cy per truck, loaded with excavator.
- (2) Estimated at 11cy per truck due to loading out frozen material.
- (3) Estimated at 11cy per truck, loaded with front end loader.

(4) Estimated at 8cy per truck

**Table 5 - Quantity of non-TSCA Material Transported to Waste Management of New Hampshire-TREE,
Rochester, N.H.**

**During the Month of December
December 2004 Monthly Report**

**GE-Pittsfield/Housatonic River Project 1.5 Mile Removal Action
Pittsfield, MA**

(Results are reported in tons)

Date Shipped	Doc. Number	Stockpile Area	Net Weight (Tons) (1)
12/01/04	0843WMNH	Cell 23E & 24E Area 64C	29.99
12/01/04	0844WMNH	Cell 23E & 24E Area 64C	29.34
12/01/04	0845WMNH	Cell 23E & 24E Area 64C	27.50
12/01/04	0846WMNH	Cell 23E & 24E Area 64C	30.08
12/01/04	0847WMNH	Cell 23E & 24E Area 64C	31.06
12/01/04	0848WMNH	Cell 23E & 24E Area 64C	30.45
12/01/04	0849WMNH	Cell 23E & 24E Area 64C	29.61
12/01/04	0850WMNH	Cell 23E & 24E Area 64C	30.03
12/01/04	0851WMNH	Cell 23E & 24E Area 64C	32.43
12/01/04	0852WMNH	Cell 23E & 24E Area 64C	32.41
12/01/04	0853WMNH	Cell 23E & 24E Area 64C	33.10
12/01/04	0854WMNH	Cell 23E & 24E Area 64C	34.17
12/01/04	0855WMNH	Cell 23E & 24E Area 64C	34.75
12/01/04	0856WMNH	Cell 23E & 24E Area 64C	34.00
12/01/04	0857WMNH	Cell 23E & 24E Area 64C	36.54
12/01/04	0858WMNH	Cell 23E & 24E Area 64C	38.27
12/01/04	0859WMNH	Cell 23E & 24E Area 64C	35.10
12/01/04	0860WMNH	Cell 23E & 24E Area 64C	36.75
12/01/04	0861WMNH	Cell 23E & 24E Area 64C	34.61
12/01/04	0862WMNH	Cell 23E & 24E Area 64C	33.36
12/02/04	0863WMNH	Cell 23E & 24E Area 64C	33.29
12/02/04	0864WMNH	Cell 23E & 24E Area 64C	28.24
12/02/04	0865WMNH	Cell 23E & 24E Area 64C	31.90
12/02/04	0866WMNH	Cell 23E & 24E Area 64C	30.75
12/02/04	0867WMNH	Cell 23E & 24E Area 64C	31.72
12/02/04	0868WMNH	Cell 23E & 24E Area 64C	32.38
12/02/04	0869WMNH	Cell 23E & 24E Area 64C	34.47
12/02/04	0870WMNH	Cell 23E & 24E Area 64D	31.64
12/02/04	0871WMNH	Cell 23E & 24E Area 64D	31.01
12/02/04	0872WMNH	Cell 23E & 24E Area 64D	32.25
12/02/04	0873WMNH	Cell 23E & 24E Area 64D	31.99
12/02/04	0874WMNH	Cell 23E & 24E Area 64D	32.32
12/02/04	0875WMNH	Cell 23E & 24E Area 64D	31.71
12/02/04	0876WMNH	Cell 23E & 24E Area 64D	30.42
12/02/04	0877WMNH	Cell 23E & 24E Area 64D	35.43

Date Shipped	Doc. Number	Stockpile Area	Net Weight (Tons) (1)
12/02/04	0878WMNH	Cell 23E & 24E Area 64D	31.75
12/02/04	0879WMNH	Cell 23E & 24E Area 64D	33.84
12/02/04	0880WMNH	Cell 23E & 24E Area 64D	32.40
12/02/04	0881WMNH	Cell 23E & 24E Area 64D	32.97
12/03/04	0882WMNH	Cell 23E & 24E Area 64D	28.44
12/03/04	0883WMNH	Cell 23E & 24E Area 64D	31.01
12/03/04	0884WMNH	Cell 23E & 24E Area 64D	31.31
12/03/04	0885WMNH	Cell 23E & 24E Area 64D	30.71
12/03/04	0886WMNH	Cell 23E, Bldg. 65	31.48
12/03/04	0887WMNH	Cell 23E, Bldg. 65	31.99
12/03/04	0888WMNH	Cell 23E, Bldg. 65	32.15
12/03/04	0889WMNH	Cell 23E, Bldg. 65	31.20
12/03/04	0890WMNH	Cell 23E, Bldg. 65	35.06
12/03/04	0891WMNH	Cell 23E, Bldg. 65	37.15
12/03/04	0892WMNH	Cell 23E, Bldg. 65	34.53
12/03/04	0893WMNH	Cell 23E & 24E Area 64D	33.77
12/03/04	0894WMNH	Cell 23E, Bldg. 65	31.45
12/03/04	0895WMNH	Cell 23E & 24E Area 64D	32.57
12/03/04	0896WMNH	Cell 23E, Bldg. 65	32.71
12/09/04	0897WMNH	Cell 23E, Bldg. 65	32.83
12/09/04	0898WMNH	Cell 23E & 24E Area 64B	29.91
12/13/04	0899WMNH	Cell 23E, Bldg. 65	30.12
12/13/04	0900WMNH	Cell 23E, Bldg. 65	30.28
12/13/04	0901WMNH	Cell 23E, Bldg. 65	31.92
12/13/04	0902WMNH	Cell 23E, Bldg. 65	32.22
12/13/04	0903WMNH	Cell 23E, Bldg. 65	30.74
12/13/04	0904WMNH	Cell 23E, Bldg. 65	32.77
12/13/04	0905WMNH	Cell 23W & 24W Bldg. 65	34.47
12/13/04	0906WMNH	Cell 23W & 24W Bldg. 65	34.35
12/13/04	0907WMNH	Cell 23W & 24W Bldg. 65	35.60
12/14/04	0908WMNH	Cell 23W & 24W Bldg. 65	32.98
12/14/04	0909WMNH	Cell 23W & 24W Bldg. 65	32.99
12/14/04	0910WMNH	Cell 23W & 24W Bldg. 65	31.27
12/14/04	0911WMNH	Cell 23W & 24W Bldg. 65	30.58
12/14/04	0912WMNH	Cell 23W & 24W Bldg. 65	32.82
12/14/04	0913WMNH	Cell 23W & 24W Bldg. 65	34.15
12/14/04	0914WMNH	Cell 23W & 24W Bldg. 65	33.43
12/14/04	0915WMNH	Cell 23W & 24W Bldg. 65	32.45
12/14/04	0916WMNH	Cell 23W & 24W Bldg. 65	33.07
12/14/04	0917WMNH	Cell 23W & 24W Bldg. 65	33.49
12/15/04	0918WMNH	Cell 24W Area 64B South	33.54
12/15/04	0919WMNH	Cell 24W Area 64B South	33.37
12/15/04	0920WMNH	Cell 24W Area 64B South	32.69
12/15/04	0921WMNH	Cell 24W Area 64B South	31.12
12/15/04	0922WMNH	Cell 24W Area 64B South	31.92

Date Shipped	Doc. Number	Stockpile Area	Net Weight (Tons) (1)
12/15/04	0923WMNH	Cell 24W Area 64B South	30.88
12/15/04	0924WMNH	Cell 24W Area 64B South	32.51
12/15/04	0925WMNH	Cell 24W Area 64B South	30.85
12/15/04	0926WMNH	Cell 24W Area 64B South	35.39
12/15/04	0927WMNH	Cell 24W Area 64B South	33.03
12/16/04	0928WMNH	Cell 24W Area 64B South	35.55
12/16/04	0929WMNH	Cell 24W Area 64B South	35.40
12/16/04	0930WMNH	Cell 24W Area 64B South	31.82
12/16/04	0931WMNH	Cell 24W Area 64B South	31.92
12/16/04	0932WMNH	Cell 24W Area 64B South	33.43
12/16/04	0933WMNH	Cell 24W Area 64B South	31.89
12/16/04	0934WMNH	Cell 24W Area 64B South	31.94
12/16/04	0935WMNH	Cell 24W Area 64B South	32.42
12/16/04	0936WMNH	Cell 24W Area 64B South	36.53
12/16/04	0937WMNH	Cell 23W &24W Bldg. 65	35.16
12/20/04	0938WMNH	Cell 23W &24W Bldg. 65	31.05
12/20/04	0939WMNH	Cell 23W &24W Bldg. 65	33.15
12/20/04	0940WMNH	Cell 23W &24W Bldg. 65	29.86
12/20/04	0941WMNH	Cell 23W &24W Bldg. 65	30.69
12/20/04	0942WMNH	Cell 23W &24W Bldg. 65	31.01
12/20/04	0943WMNH	Cell 23W &24W Bldg. 65	34.02
12/20/04	0944WMNH	Cell 23W &24W Bldg. 65	31.43
12/20/04	0945WMNH	Cell 23W &24W Bldg. 65	31.52
12/21/04	0946WMNH	Cell 23W &24W Bldg. 65	28.54
12/21/04	0947WMNH	Cell 23W &24W Bldg. 65	31.23
Total of Material Disposed			3,405.86

Notes:

(1) Net weights established at the disposal facility

**Table 6- NPDES Sampling Results for Water Treatment System
December 2004 Monthly Report**

**GE-Pittsfield/Housatonic River Project 1.5 Mile Removal Action
Pittsfield, MA**

(Results are presented in part per billion, ppb)

Sample ID	Location	Date Collected	Aroclor 1016, 1221, 1232, & 1242	Aroclor 1248	Aroclor 1254	Aroclor 1260	Total PCBs
H2-WW000001-0-4D06	Influent	06-Dec-04	ND(0.040)	ND(0.040)	0.10	0.24	0.34
H2-WW000002-0-4D06	Intermediate	06-Dec-04	ND(0.013)	ND(0.013)	0.017	0.017	0.034
H2-WW000003-0-4D06	Effluent	06-Dec-04	ND(0.013)	ND(0.013)	ND(0.013)	ND(0.013)	ND(0.013)
Action Level	Effluent		0.50	0.50	0.50	0.50	0.50

Notes:

ND(0.013) - Analyte was not detected. The value in parentheses is the associated detection limit.

Intermediate - Sample collected between carbon units which are being operated in series.

**Table 7 - Summary of Turbidity, PCB, and TSS Water Column Monitoring Results
December 2004 Monthly Report**

**GE-Pittsfield/Housatonic River Project 1.5 Mile Removal Action
Pittsfield, MA**

Location	Date	Estimated Flow (cfs)	Turbidity (ntu)			Water Temp. (°C)	Calculated Flow Beginning (cfs)	Calculated Flow End (cfs)	Sample ID	Total PCB Concentration (ug/l)	Filtered PCB Concentration (ug/l)	TSS (mg/l)
			High	Low	Daily Average							
Upstream of Newell St. Bridge	12/02/04	289	NS	NS	NS	NS	NS	NS	H0-SW000054-0-4D02	NS	NS	NS
Downstream of Lyman St. Bridge	12/02/04	289	N/A	N/A	N/A	4.03	NS	NS	H2-SW000055-0-4D02	ND(0.015)	ND(0.014)	9.3
Downstream of Pomeroy Ave. Bridge	12/02/04	289	N/A	N/A	N/A	4.18	401.9	368.3	H2-SW000052-0-4D02	0.10	ND(0.015)	8.5
Downstream of Pomeroy Ave. Bridge (duplicate)	12/02/04	289	N/A	N/A	N/A	4.18	401.9	368.3	H2-SW000052-1-4D02	NS	ND(0.015)	NS

Notes:
PCB Action Level - Downstream (Pomeroy Avenue) \geq Downstream (Lyman Street) + 5 ug/L
 ND(0.013) - Analyte was not detected. The value in parentheses is the associated detection limit.
 cfs - Cubic feet per second
 ntu - nephelometric turbidity units
 NS - Not Sampled
 Temperature measured YSI 600 oms system.
 Flow data was obtained from the USGS Station 01197000 in Coltsville, MA at approximately midday.
 Water column samples were collected as 4 grab composite samples.
 Two flow values calculated, one at the beginning of the sampling event and one at the end of sampling event.
 N/A - Turbidity monitoring program was not conducted during December.

**Table 8 - PCB Air Sampling Results
December 2004 Monthly Report**

**GE-Pittsfield/Housatonic River Project 1.5 Mile Removal Action
Pittsfield, MA**

(Results are presented in $\mu\text{g}/\text{m}^3$)

Sample ID	Location (1)	Date Collected	Aroclor 1016, & 1242	Aroclor 1221, 1232, & 1248	Aroclor 1254	Aroclor 1260	Total PCBs
H2-AR000007-0-4N23	background	23-Nov-04	ND(0.00284)	ND(0.00284)	ND(0.00284)	ND(0.00284)	ND(0.00284)
H2-AR000037-0-4N23	AR000037	23-Nov-04	ND(0.00288)	ND(0.00288)	ND(0.00288)	ND(0.00288)	ND(0.00288)
H2-AR000038-0-4N23	AR000038	23-Nov-04	ND(0.00277)	ND(0.00277)	ND(0.00277)	ND(0.00277)	ND(0.00277)
H2-AR000040-0-4N23	AR000040	23-Nov-04	ND(0.00423)	ND(0.00423)	ND(0.00423)	ND(0.00423)	ND(0.00423)
H2-AR000041-0-4N23	AR000041	23-Nov-04	ND(0.00299)	ND(0.00299)	ND(0.00299)	ND(0.00299)	ND(0.00299)
H2-AR000041-1-4N23 (duplicate)	AR000041	23-Nov-04	ND(0.00273)	ND(0.00273)	ND(0.00273)	ND(0.00273)	ND(0.00273)
H2-AR000007-0-4D04	background	04-Dec-04	ND(0.00273)	ND(0.00273)	ND(0.00273)	ND(0.00273)	ND(0.00273)
H2-AR000037-0-4D04	AR000037	04-Dec-04	ND(0.00266)	ND(0.00266)	ND(0.00266)	ND(0.00266)	ND(0.00266)
H2-AR000038-0-4D04	AR000038	04-Dec-04	ND(0.00263)	ND(0.00263)	ND(0.00263)	ND(0.00263)	ND(0.00263)
H2-AR000040-0-4D04	AR000040	04-Dec-04	ND(0.00243)	ND(0.00243)	ND(0.00243)	ND(0.00243)	ND(0.00243)
H2-AR000041-0-4D04	AR000041	04-Dec-04	ND(0.00305)	ND(0.00305)	ND(0.00305)	ND(0.00305)	ND(0.00305)
H2-AR000041-1-4D04 (duplicate)	AR000041	04-Dec-04	ND(0.00279)	ND(0.00279)	ND(0.00279)	ND(0.00279)	ND(0.00279)

Notes:

Notification Level: $0.05\mu\text{g}/\text{m}^3$

Action Level: $0.1\mu\text{g}/\text{m}^3$

1- See Figure 1 for locations

**Table 9 - Equipment Confirmatory Wipe Samples
December 2004 Monthly Report**

**GE-Pittsfield/Housatonic River Project 1.5 Mile Removal Action
Pittsfield, MA**

(Results are presented in $\mu\text{g}/100 \text{ cm}^2$)

Sample ID	Date Collected	Aroclor 1016, 1221, 1232, 1242, & 1248	Aroclor 1254	Aroclor 1260	Total PCBs
H2-XI000178-0-4D07	07-Dec-04	ND(0.25)	ND(0.25)	ND(0.25)	ND(0.25)
H2-XI000179-0-4D07	07-Dec-04	ND(0.25)	ND(0.25)	ND(0.25)	ND(0.25)
H2-XI000180-0-4D08	08-Dec-04	ND(0.25)	ND(0.25)	ND(0.25)	ND(0.25)
H2-XI000181-0-4D08	08-Dec-04	ND(0.25)	1.0	1.7	2.7

Notes:

PCB Action Level - $10.0 \mu\text{g}/100 \text{ cm}^2$

ND(0.25) - Analyte was not detected. The value in parentheses is the associated detection limit.

Table 10 - Post Excavation Soil/ Sediment Stockpile Characterization Analytical Results
December 2004 Monthly Report
GE-Pittsfield/Housatonic River Project 1.5 Mile Removal Action
Pittsfield, MA

(Results are presented in part per million, ppm)

Sample ID	H2-OT000220-0-4D02	H2-OT000221-0-4D02
Sample type	stockpile material characterization	stockpile material characterization
Date Collected	12/02/2004	12/02/2004
Stockpile Location	Building 65	Building 65
Analyte		
PCBS		
AROCLOR-1254	1.1	0.95
AROCLOR-1260	6.6	4.1
PCB, TOTAL	7.7	5.1
INORGANICS		
PAINT FILTER LIQUIDS (ml)	ABSENT	ABSENT
PERCENT SOLIDS (%)	87.3	86.2

Notes:

Only detected constituents are summarized

Table 11 - Water Treatment System Modutank Sediment Material Characterization Testing Results
December 2004 Monthly Report
GE-Pittsfield/Housatonic River Project 1.5 Mile Removal Action
Pittsfield, MA

(Results are presented in part per million, ppm)

Sample ID	H2-OT000222-0-4D07	H2-OT000223-0-4D07
Sample type	stockpile material characterization	stockpile material characterization
Date Collected	12/7/2004	12/7/2004
Stockpile Location	Building 68 Modutank Material	Building 68 Modutank Material
Analyte		
PCBS		
AROCOR-1254	1.1	1.2
AROCOR-1260	4.1	4.8
PCB, TOTAL	5.2	6.0
APP IX SEMIVOLATILES		
2-METHYLNAPHTHALENE	4.6	1.3 J
ACENAPHTHENE	11	2.6
ACENAPHTHYLENE	.88 J	.41 J
ANTHRACENE	11	3.1
BENZO(A)ANTHRACENE	7.7	3.3
BENZO(A)PYRENE	6.4	2.7
BENZO(B)FLUORANTHENE	3 J	1.6 J
BENZO(GHI)PERYLENE	2.9 J	1.2 J
BENZO(K)FLUORANTHENE	5.4	2.4
BIS(2-ETHYLHEXYL) PHTHALATE	ND	.16 J
CHRYSENE	6.9	3
DIBENZO(A,H)ANTHRACENE	.84 J	.35 J
DIBENZOFURAN	1.3 J	.56 J
DI-N-OCTYL PHTHALATE	.46 J	ND
FLUORANTHENE	14	5.4
FLUORENE	7.4	2.1
INDENO(1,2,3-C,D)PYRENE	2.3 J	1.1 J
NAPHTHALENE	4.4	1.2 J
PHENANTHRENE	32	8.6
PYRENE	19	7.5
APP IX VOLATILES		
ACETONE	ND	.026
CARBON DISULFIDE	ND	.0015 J
NAPHTHALENE	3	.0047 J
TETRACHLOROETHYLENE(PCE)	ND	.0013 J
TCLP HERBICIDES		
	all Non-Detects	all Non-Detects
TCLP METALS		
BARIUM, TCLP LEACHATE (mg/l)	.156	.228
CADMIUM, TCLP LEACHATE (mg/l)	.00086	.00099
CHROMIUM, TCLP LEACHATE (mg/l)	.0021	.0044
LEAD, TCLP (mg/l)	.0012	ND
TCLP PESTICIDES		
	all Non-Detects	all Non-Detects
TCLP SEMIVOLATILES		
	all Non-Detects	all Non-Detects
TCLP VOLATILES		
	all Non-Detects	all Non-Detects
INORGANICS		
CORROSIVITY BY PH	7.8	7.7
IGNITABILITY (deg f)	>150	>150
PAINT FILTER LIQUIDS (ml)	ABSENT	ABSENT
PERCENT SOLIDS (%)	78.4	81.1
ORGANIC		
PETROLEUM HYDROCARBON	207.0	202.0

Notes:

Only detected constituents are summarized

ND - not detected

J - Indicates an estimated value



Photograph 1 – Cells 23W Riverbank Cellular Geoweb and Topsoil Installation



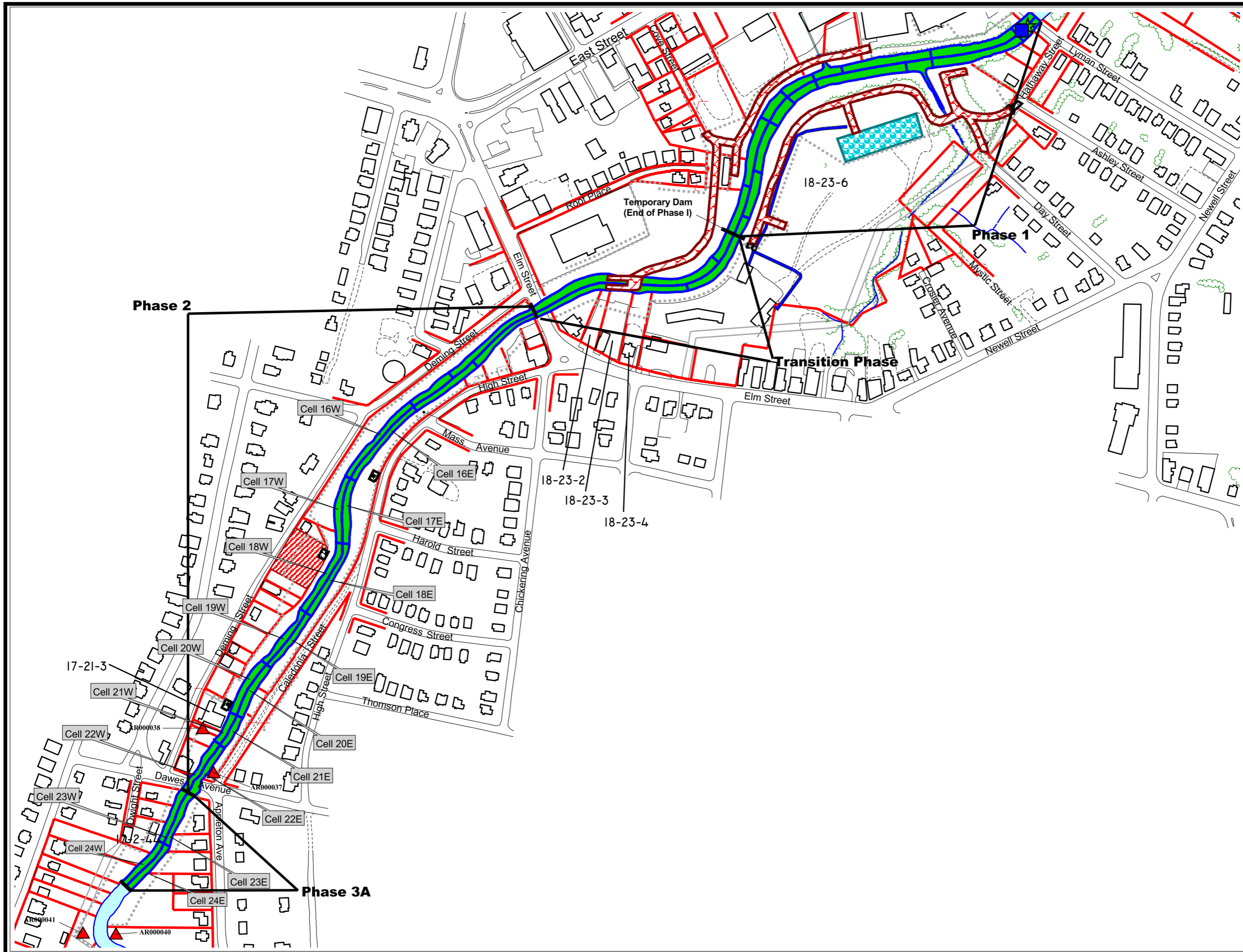
Photograph 2 – Cells 23 and 24 Restoration Completed



Photograph 3 – Overview of Restored Riverbed and Riverbanks upstream of Dawes Avenue Bridge



Photograph 4– 54-inch HDPE Pipe Removal Test Cut



LEGEND

- Roads
- Surface Water
- Water Treatment Plant*
- Access Roads
- Asphalt Access Road
- Property Lines
- Loadout Area
- Deming Street Staging/Loadout Area
- Fence line*
- Work Completed
- Work In Progress
- Work Pending
- Turbidity Monitoring Locations
- Air Sampling Locations
- Water Monitoring Locations
- Buried Electric/Telephone Line*

*Note: As-built features were located using a real time GPS unit



Scale in Feet

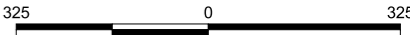


Figure 1
1.5 Mile Removal Action
Site Map
December 2004 Monthly Report